


		NTSB ID: NYC04LA082		Aircraft Registration Number: N163GT	
		Occurrence Date: 03/07/2004		Most Critical Injury: Minor	
		Occurrence Type: Accident		Investigated By: NTSB	
Location/Time					
Nearest City/Place Frederick	State MD	Zip Code 21701	Local Time 1053	Time Zone EST	
Airport Proximity: Off Airport/Airstrip		Distance From Landing Facility:			
Aircraft Information Summary					
Aircraft Manufacturer SOCATA		Model/Series TB-20		Type of Aircraft Airplane	
Revenue Sightseeing Flight: No			Air Medical Transport Flight: No		
Narrative					
<p>Brief narrative statement of facts, conditions and circumstances pertinent to the accident/incident:</p> <p>On March 7, 2004, at 1053 eastern standard time, N163GT, a Socata TB-20, was substantially damaged during a forced landing following a total loss of engine power, after departing from the Frederick Municipal Airport (FDK), Frederick, Maryland. The certificated private pilot and passenger received minor injuries. Visual meteorological conditions prevailed and no flight plan was filed for the local personal flight conducted under 14 CFR Part 91.</p> <p>The pilot stated that he performed a complete preflight inspection and noticed no abnormalities with the engine. During the initial takeoff climb from runway 30, at an altitude of 400 feet, he noticed the engine power decrease to 1,500 rpm, and several seconds later, the engine lost complete power. The pilot then performed a forced landing to a soft field, during which the wings and fuselage of the airplane were substantially damaged.</p> <p>A Federal Aviation Administration (FAA) inspector performed a preliminary examination of the airplane after the accident. According to the inspector, he observed about 2-3 gallons of fuel in the left wing fuel tank; however, the tank was breached. The inspector reported there was "sufficient" fuel in the right tank. Examination of the cockpit throttle and propeller controls revealed they were in the full forward position, and the mixture control, which sustained impact damage, was in the 3/4 full forward position. The spark plugs were removed, and no anomalies were noted. The fuel servo displayed impact damage, and the fuel inlet line was separated from the inlet side of the servo.</p> <p>The engine was test run on the airframe with a replacement fuel injector and fuel line. The engine started, and ran for several seconds, without any anomalies, before being shut down.</p> <p>The National Transportation Safety Board's Metallurgical Lab examined pictures taken of the fuel injector inlet line, by an electron scanning microscope. According to the Metallurgical Lab, the damage to the fuel line was consistent with impact damage, and no evidence of cross-threading was noted.</p> <p>According to the operator of the airplane, it had been topped off with fuel the day prior to the accident, and had flown about 2.5 hours since then.</p> <p>A 100-hour inspection was performed on the airplane on March 2, 2004, and the airplane had flown approximately 8 hours since then.</p>					
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 National Transportation Safety Board FACTUAL REPORT AVIATION		NTSB ID: NYC04LA082				
		Occurrence Date: 03/07/2004				
		Occurrence Type: Accident				
Landing Facility/Approach Information						
Airport Name Frederick Municipal Airport		Airport ID: FDK	Airport Elevation 303 Ft. MSL	Runway Used 30	Runway Length 3600	Runway Width 75
Runway Surface Type: Asphalt						
Runway Surface Condition: Dry						
Approach/Arrival Flown: NONE						
VFR Approach/Landing: Forced Landing						
Aircraft Information						
Aircraft Manufacturer SOCATA		Model/Series TB-20		Serial Number 2000		
Airworthiness Certificate(s): Normal						
Landing Gear Type: Retractable - Tricycle						
Amateur Built Acft? No		Number of Seats: 4		Certified Max Gross Wt. LBS	Number of Engines: 1	
Engine Type: Reciprocating		Engine Manufacturer: Lycoming		Model/Series: IO-540		Rated Power: 250 HP
- Aircraft Inspection Information						
Type of Last Inspection 100 Hour		Date of Last Inspection 03/2004		Time Since Last Inspection 8 Hours		Airframe Total Time 1126 Hours
- Emergency Locator Transmitter (ELT) Information						
ELT Installed?/Type Yes /		ELT Operated? Yes		ELT Aided in Locating Accident Site? No		
Owner/Operator Information						
Registered Aircraft Owner Delmarva Aviation Services Inc.		Street Address 3511 Silverside Rd., Suite 105				
		City Wilmington		State DE	Zip Code 19810	
Operator of Aircraft Frederick Flight Center		Street Address				
		City Frederick		State MD	Zip Code	
Operator Does Business As:				Operator Designator Code:		
- Type of U.S. Certificate(s) Held: None						
Air Carrier Operating Certificate(s):						
Operating Certificate:			Operator Certificate:			
Regulation Flight Conducted Under: Part 91: General Aviation						
Type of Flight Operation Conducted: Personal						
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First Pilot Information																																																																																																	
Name On File			City On File		State On File	Date of Birth On File	Age 52																																																																																										
Sex: M	Seat Occupied: Left		Occupational Pilot? Unknown			Certificate Number: On File																																																																																											
Certificate(s): Private																																																																																																	
Airplane Rating(s): Single-engine Land																																																																																																	
Rotorcraft/Glider/LTA: None																																																																																																	
Instrument Rating(s): None																																																																																																	
Instructor Rating(s): None																																																																																																	
Current Biennial Flight Review? 07/2003																																																																																																	
Medical Cert.: Class 3		Medical Cert. Status: Valid Medical--w/ waivers/lim.			Date of Last Medical Exam: 12/2002																																																																																												
<table border="1"> <thead> <tr> <th rowspan="2">- Flight Time Matrix</th> <th rowspan="2">All A/C</th> <th rowspan="2">This Make and Model</th> <th rowspan="2">Airplane Single Engine</th> <th rowspan="2">Airplane Multi-Engine</th> <th rowspan="2">Night</th> <th colspan="2">Instrument</th> <th rowspan="2">Rotorcraft</th> <th rowspan="2">Glider</th> <th rowspan="2">Lighter Than Air</th> </tr> <tr> <th>Actual</th> <th>Simulated</th> </tr> </thead> <tbody> <tr> <td>Total Time</td> <td>568</td> <td>430</td> <td>568</td> <td>0</td> <td>33</td> <td>12</td> <td>116</td> <td></td> <td></td> <td></td> </tr> <tr> <td>Pilot In Command(PIC)</td> <td>438</td> <td>430</td> <td>438</td> <td>0</td> <td>33</td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>Instructor</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>Instruction Received</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>Last 90 Days</td> <td>10</td> <td>10</td> <td>10</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>Last 30 Days</td> <td>3</td> <td>3</td> <td>3</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>Last 24 Hours</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> </tbody> </table>								- Flight Time Matrix	All A/C	This Make and Model	Airplane Single Engine	Airplane Multi-Engine	Night	Instrument		Rotorcraft	Glider	Lighter Than Air	Actual	Simulated	Total Time	568	430	568	0	33	12	116				Pilot In Command(PIC)	438	430	438	0	33						Instructor											Instruction Received											Last 90 Days	10	10	10								Last 30 Days	3	3	3								Last 24 Hours										
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Seatbelt Used? Yes		Shoulder Harness Used? No			Toxicology Performed? No		Second Pilot? No																																																																																										
Flight Plan/Itinerary																																																																																																	
Type of Flight Plan Filed: None																																																																																																	
Departure Point		State			Airport Identifier		Departure Time		Time Zone																																																																																								
Same as Accident/Incident Location					FDK				EST																																																																																								
Destination		State			Airport Identifier																																																																																												
Local Flight					FDK																																																																																												
Type of Clearance: None																																																																																																	
Type of Airspace: Class G																																																																																																	
Weather Information																																																																																																	
Source of Wx Information:																																																																																																	
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		Occurrence Type: Accident			

Weather Information					
WOF ID	Observation Time	Time Zone	WOF Elevation	WOF Distance From Accident Site	Direction From Accident Site
FDK	1100	EST	303 Ft. MSL	NM	Deg. Mag.
Sky/Lowest Cloud Condition: Clear				Ft. AGL	Condition of Light: Day
Lowest Ceiling: None			Ft. AGL	Visibility: 10 SM	Altimeter: 29.98 "Hg
Temperature: 14 °C	Dew Point: 1 °C	Weather Conditions at Accident Site: Visual Conditions			
Wind Direction: 280	Wind Speed: 8	Wind Gusts:			
Visibility (RVR): Ft.	Visibility (RVV) SM				
Precip and/or Obscuration:					

Accident Information		
Aircraft Damage: Substantial	Aircraft Fire: None	Aircraft Explosion: None

- Injury Summary Matrix	Fatal	Serious	Minor	None	TOTAL	
First Pilot			1		1	
Second Pilot						
Student Pilot						
Flight Instructor						
Check Pilot						
Flight Engineer						
Cabin Attendants						
Other Crew						
Passengers			1		1	
- TOTAL ABOARD -			2		2	
Other Ground						
- GRAND TOTAL -			2		2	

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Administrative Information		
Investigator-In-Charge (IIC) Jill M. Andrews		
Additional Persons Participating in This Accident/Incident Investigation: Tony Serio FAA/FSDO Glen Burnie, MD		
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